From: Lily Lee [lilychinatemp@yahoo.com]

Sent: 4/2/2019 11:43:24 PM

To: Huang, Judy [Huang.Judy@epa.gov]; LEE, LILY [LEE.LILY@EPA.GOV]; kbrasaemle@techlawinc.com

Subject: Fw: Durable Cover Soil Requirements

Attachments: Pages from Final_RAWP_IR07 B D G D_1-18-Text Figures Tables.pdf

Judy could you help?

Karla,

Would it be easier for Judy to ask Leslie Howard for the rad criteria for import fill?

Sent from Yahoo Mail for iPhone

Begin forwarded message:

On Wednesday, April 3, 2019, 7:19 AM, Lily Lee https://www.kilylinetemp@yahoo.com wrote:

Thank you Karla for this publicly available info.

Yolanda has a ppt from a member of the public who told us that the ROD RGs are the import criteria.

Yolanda could you give KArla the citation in the ppt?

Lily

Sent from Yahoo Mail for iPhone

Begin forwarded message:

On Wednesday, April 3, 2019, 3:16 AM, Brasaemle, Karla < Karla. Brasaemle@TechLawInc.com> wrote:

As it turns out, the Parcel G durable cover was all asphalt and asphalt base course (gravel).

However, the requirements for a soil durable cover, as well as for backfilling Parcel G hot spot excavations (non-rad) were first outlined in the IR 7/18 and B, G, and D-1 Hot Spot RAWP:

"The soil covers for IR Sites 07 and 18 will be constructed with imported fill. Import fill material will

comply with the HPS Project Backfill Review and Acceptance Procedure (HPO-Tt-0270) and the

geotechnical requirements in the project specifications."

For sampling requirements, the text says:

"Prior to importing backfill material to the site, soil samples will be collected from each borrow source to

confirm that proposed backfill material meets the requirements for clean backfill. Soil may be obtained

from multiple borrow sources; samples from borrow sources will be analyzed for potential contaminants

based on the Department of Toxic Substances Control (DSTC) Advisory (DTSC, 2001). It should be

noted that each borrow source will be characterized individually. Sample frequency will also be dictated

by the DTSC Advisory. Per the DTSC advisory (DTSC, 2001), the backfill will be analyzed for site specific

COCs and additional potential contaminants based on the fill source area. For this project, fill

sourced from land near a quarry will be analyzed for heavy metals, VOCs, SVOCs, PCBs, pH, and

asbestos by the off-site laboratory. Fill sourced from residential and commercial land or dirt market will

be analyzed for heavy metals, VOCs, SVOCs, PCBs, TPH, asbestos, and pH by the off-site laboratory.

All backfill sources will also be analyzed for radiological parameters in accordance with the SAP

(Appendix B). The radiological subcontractor will screen all proposed backfill materials for potential

radiological contamination prior to import. Analyses for gamma-emitting radionuclides (including ROCs

137Cs and 226Ra) will be performed by the on-site laboratory. Ten percent of samples will also be sent to

the off-site laboratory for quality assurance purposes. Sample results will be screened against site specific

project action limits (PALs) (Appendix B). If a source is found to satisfy the project's import fill

criteria, the results of the radiological screening and sampling of borrow sources will be provided to

RASO for concurrence to permit the use of the material on site."

For backfilling hot spot excavations, including those on Parcel G, the plan says:

"Once authorized by the RPM, all hotspot excavations will be backfilled with clean import soil. Import

soil will have the same characteristics as the soil to be used for the cover at IR Sites 07 and 18. Chemical

analysis of import fill will be performed in accordance with the SAP (Appendix B). Geotechnical testing

will be performed in accordance with the contract specifications for the soil cover at IR Sites 07 and 18."

So far I have been unable to locate the cited HPS Project Backfill Review and Acceptance Procedure (HPO-Tt-0270), although I've seen reference to it in more than one document.

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